

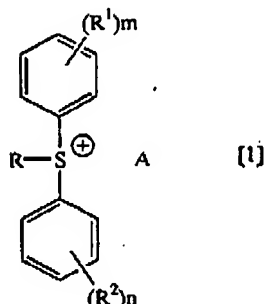
Amendments to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application.

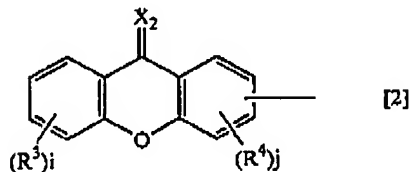
Listing of Claims:

1. (Canceled)

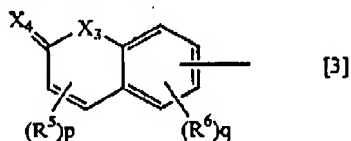
2. (Currently Amended) ~~An onium salt according to claim 1, wherein the A~~ heterocycle-containing onium salt ~~is one~~ shown by the general formula [1]:



[wherein R is a group shown by the general formula [2]:

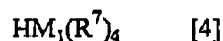


(wherein R³ and R⁴ are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X₂ is an oxygen atom or a sulfur atom; i is an integer of 0 to 4; and j is an integer of 0 to 3), or a group shown by the general formula [3]:



(wherein R⁵ and R⁶ are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X₃ and X₄ are each independently

an oxygen atom or a sulfur atom; p is an integer of 0 to 2; and q is an integer of 0 to 3); R¹ and R² are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; m and n are each independently an integer of 0 to 5; and A is a halogen atom or an anion derived from an inorganic strong acid, an organic acid or a compound shown by the general formula [4]:



(wherein M₁ is a boron atom or a gallium atom; and R⁷ is an aryl group which may have a substituent selected from a haloalkyl group having 1 to 6 carbon atoms, a halogen atom, a nitro group and a cyano group)].

3. (Canceled)

4. (Original) A salt according to claim 2, wherein the anion derived from an inorganic strong acid, shown by A is one derived from nitric acid, sulfuric acid, halosulfuric acid, perhalogenic acid or a compound shown by the general formula [5]:



(wherein M₂ is a metalloid atom or a metal atom; and k is an integer of 4 or 6).

5. (Original) A salt according to claim 4, wherein the metalloid atom shown by M₂ is a boron atom, a silicon atom, a phosphorus atom, an arsenic atom or an antimony atom; and the metal atom shown by M₂ is an aluminum atom, a titanium atom, an iron atom, a nickel atom, a zirconium atom or a gallium atom.

6. (Original) A salt according to claim 2, wherein the anion derived from the organic acid shown by A is one derived from a sulfonic acid shown by the general formula [6]:



(wherein R⁸ is an alkyl group, an aryl group or an aralkyl group, which may have a halogen atom), or a carboxylic acid shown by the general formula [7]:

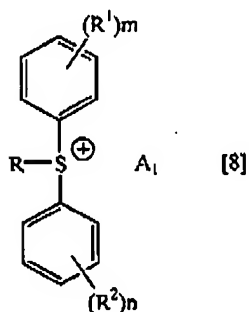


(wherein R⁹ is an alkyl group, an aryl group or an aralkyl group, which may have a halogen atom).

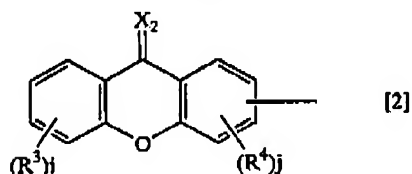
7. (Original) A salt according to claim 2, wherein R is a group shown by the general formula [2].
8. (Original) A salt according to claim 7, wherein X₂ in the general formula [2] is an oxygen atom.
9. (Original) A salt according to claim 7, wherein the group shown by the general formula [2] is a xanthonyl group.
10. (Original) A salt according to claim 2, wherein R is a group shown by the general formula [3].
11. (Original) A salt according to claim 10, wherein each X₃ and X₄ in the general formula [3] is an oxygen atom.
12. (Original) A salt according to claim 10, wherein the group shown by the general formula [3] is a coumarinyl group.
13. (Original) A salt according to claim 2, wherein the sulfonium salt shown by the general formula [1] is diphenyl(xanthene-9-one-2-yl)sulfonium hexafluorophosphate or (coumarin-7-yl)diphenylsulfonium hexafluorophosphate.
- 14-23. (Canceled)

24. (Previously presented)

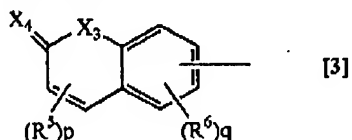
A cationic photopolymerization initiator comprising a heterocycle-containing onium salt shown by the general formula [8]:



[wherein R is a group shown by the general formula [2]:

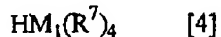


(wherein R³ and R⁴ are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X₂ is an oxygen atom or a sulfur atom; i is an integer of 0 to 4; and j is an integer of 0 to 3), or a group shown by the general formula [3]:



(wherein R⁵ and R⁶ are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X₃ and X₄ are each independently an oxygen atom or a sulfur atom; p is an integer of 0 to 2; and q is an integer of 0 to 3); R¹ and R² are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; m and n are each independently an integer of 0 to 5;

and A_1 is an anion derived from an inorganic strong acid, a sulfonic acid or a compound shown by the general formula [4]:



(wherein M_1 is a boron atom or a gallium atom; R^7 is an aryl group which may have a substituent selected from a haloalkyl group having 1 to 6 carbon atoms, a halogen atom, a nitro group and a cyano group)].

25. (Original) A polymerization initiator according to claim 24, wherein A_1 is an anion derived from the compound shown by the general formula [4] or an inorganic strong acid shown by the general formula [5]:



(wherein M_2 is a metalloid atom or a metal atom; and k is an integer of 4 or 6).

26. (Original) A polymerization initiator according to claim 24, wherein the sulfonium salt shown by the general formula [8] is diphenyl(xanthene-9-one-2-yl)sulfonium hexafluorophosphate or (coumarin-7-yl)diphenylsulfonium hexafluorophosphate.

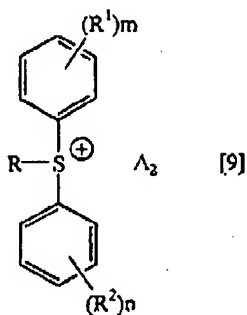
27-29. (Canceled)

30. (Original) A method for polymerization of an epoxy monomer, which comprises using the polymerization initiator in claim 24.

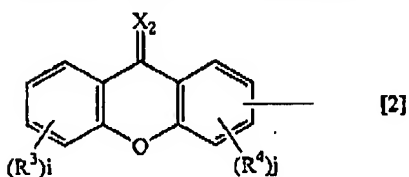
31. (Original) A method for polymerization of a vinyl ether monomer, which comprises using the polymerization initiator in claim 24.

32-33. (Canceled)

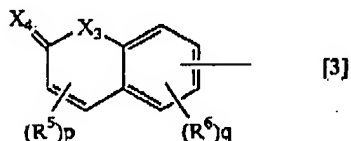
34. (Previously presented) An acid generator for a resist, comprising a sulfonium salt shown by the general formula [9]:



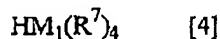
[wherein R is a group shown by the general formula [2]:



(wherein R^3 and R^4 are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X_2 is an oxygen atom or a sulfur atom; i is an integer of 0 to 4; and j is an integer of 0 to 3), or a group shown by the general formula [3]:



(wherein R^5 and R^6 are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; X_3 and X_4 are each independently an oxygen atom or a sulfur atom; p is an integer of 0 to 2; and q is an integer of 0 to 3); R^1 and R^2 are each independently a halogen atom, an alkyl group which may have a halogen atom or an aryl group as a substituent, or an aryl group which may have a halogen atom or an alkyl group having 1 to 6 carbon atoms as a substituent; m and n are each independently an integer of 0 to 5; and A_2 is an anion derived from an inorganic strong acid, an organic acid or a compound shown by the general formula [4]:



(wherein M_1 is a boron atom or a gallium atom; and R^7 is an aryl group which may have a substituent selected from a haloalkyl group having 1 to 6 carbon atoms, a halogen atom, a nitro group and a cyano group)].

35. (Original) An acid generator according to claim 34, wherein the sulfonium salt shown by the general formula [9] is diphenyl(xanthene-9-one-2-yl)sulfonium hexafluorophosphate or (coumarin-7-yl)diphenylsulfonium hexafluorophosphate.

36-37. (Canceled)